

# Yellowstone

125th Anniversary 1872-1997

Official Map and Guide

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Yellowstone National Park is a treasure that inspires awe in travelers from around the world. New Zealand and Iceland are known for their geysers, but nowhere are there as many as in Yellowstone. At the heart of Yellowstone's past, present, and future lies volcanism. About 2 million years ago, then 1.2 million years ago, and then again 600,000 years ago, catastrophic volcanic eruptions occurred here. The latest eruption spewed out nearly 240 cubic miles of debris. What is now the park's central portion then collapsed, forming a 28- by 47-mile caldera, or basin. The magmatic heat powering those eruptions still powers the park's famous geysers, hot springs, fumaroles, and mud pots. The spectacular Grand

Canyon of the Yellowstone River provides a glimpse of Earth's interior. Its waterfalls highlight the boundaries of lava flows and thermal areas. Rugged mountains flank the park's volcanic plateau, rewarding with eye and spirit. Yellowstone's wildlife includes the American bison, elk, grizzly and black bears, trumpeter swans, and Yellowstone cutthroat trout. A variety of vegetation types is encountered, from near-desert vegetation around the North Entrance to subalpine meadows and forests on Mt. Washburn. Lodgepole pine covers about 60 percent of the park and constitutes about 80 percent of the forested areas. Yellowstone would be a premier national park for its scenery or its wildlife alone, but its history

also resonates with colorful tales of fur trappers—Jim Bridger and Osborne Russell—and explorers and surveyors, with their photographs and artists. William Henry Jackson's photographs and Thomas Moran's sketches influenced Congress to establish Yellowstone as the world's first national park in 1872. This national park idea has become a land-use model for many nations, and Yellowstone has evolved from a pleasuring ground and wildlife refuge to be recognized today as an International Biosphere Reserve and World Heritage Site as well. The guide below can help you choose what to see within the time limits of your Yellowstone visit. We hope it will make your travel more

efficient and rewarding. The guide presents capsule advice on three segments of the park's Grand Loop. This figure-8 shaped road system was designed to present the park's major attractions to travelers. Facilities and services are shown on the maps, and may also be found in the primary communities—Jackson and Cody, Wyo., and West Yellowstone, Gardiner, Silver Gate, and Cooke City, Mont. Just at the visitor centers for other publications to help you explore the park. And remember: Park roads sample but a fraction of Yellowstone National Park. The rest is backcountry—traversed by 1,000 miles of trails.

## A Guide to the Park and Its Wildlife



### Regulations to Protect You and the Park

All wildlife, especially bison and bears, can be dangerous. Keep your distance. Never approach, harass, or feed any animals, even small ones. It's against the law to approach within 100 yards of bears or within 25 yards of other wildlife or within any distance where harassment is likely. Feeding wildlife is unlawful. Throwing coins and

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other items into thermal pools damages them and is illegal. Climbing the Canyon area is dangerous and is prohibited. Swimming or bathing in thermal pools or streams whose waters originate entirely from a thermal spring or pool is prohibited. Boating and fishing per-

mits are required and available at ranger stations. Boating is allowed on lakes, rivers, and streams, but is prohibited on the Yellowstone River. A valid driver's license is required to operate a vehicle. A valid hunting license is required to hunt. A valid fishing license is required to fish. A valid boating license is required to operate a boat. A valid hunting license is required to hunt. A valid fishing license is required to fish. A valid boating license is required to operate a boat.

### Where to Watch for Wildlife

Yellowstone is a great place to watch for wildlife. The park is home to a variety of animals, including bison, elk, moose, deer, and birds of prey. The best places to watch for wildlife are in the Grand Canyon of the Yellowstone, the Hayden Valley, and the Lamar Valley. The Grand Canyon of the Yellowstone is a great place to watch for bison, elk, and moose. The Hayden Valley is a great place to watch for bison, elk, and moose. The Lamar Valley is a great place to watch for bison, elk, and moose.

### Bear Country

Yellowstone is a great place to watch for bears. The park is home to a variety of bears, including grizzly bears and black bears. The best places to watch for bears are in the Grand Canyon of the Yellowstone, the Hayden Valley, and the Lamar Valley. The Grand Canyon of the Yellowstone is a great place to watch for grizzly bears. The Hayden Valley is a great place to watch for grizzly bears. The Lamar Valley is a great place to watch for grizzly bears.



Old Faithful geyser erupts.

## Old Faithful to Mammoth Hot Springs

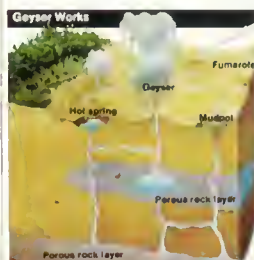


Diagram showing the route from Old Faithful to Mammoth Hot Springs.

**Old Faithful to Madison.** In Black Sand Basin the bright colors of Sulfur Lake and Emerald Pool attract photographers. At Biscuit Basin, mineral deposits look on blackish shapes before a 1959 earthquake triggered changes destroying the biscuits. At Midway Geyser Basin you may walk to Excelsior Geyser Crater and Grand Prismatic Spring. Firehole Lake Drive (one way, northbound) loops off the main road to Great Fountain Geyser, Firehole Lake and various hot pools. The Lower Geyser Basin features the Fountain Paint Pot. Firehole Canyon road drive (one way southbound) starting south of Madison Junction passes by Firehole Falls. Roadside forests are mainly lodgepole pine, some reddened by the feeding of mountain pine beetles, and others burned by wildfire in 1988. West Yellowstone, Mont., is 14 miles west of Madison Junction. From Madison to Norris you drive along the Yellowstone caldera's northwest rim. Gibbon Falls cascades over the caldera wall.

**Norris Junction to Mammoth Hot Springs.** Norris Geyser Basin's array of thermal features is unparalleled. Steamboat Geyser, the world's largest, erupts at irregular intervals of days to years. Echinus Geyser erupts about once per hour. Peridot Basin is Yellowstone's hottest exposed area. Exhibits at Norris Museum explain geyser workings.

At Norris Junction you can turn east toward the Canyon area. At Canyon you can go north to Tower or south to Lake (see tours at right). Continuing north of Norris you pass Obsidian Cliff. Obsidian, a volcanic glass, excellent for projectile points and cutting tools, was traded across North America by Native Americans. Two miles south of Mammoth Hot Springs the Upper Terrace Loop Drive passes through a thermal area. Garfield timber pines on some extinct formations are more than 500 years old. At Mammoth Hot Springs travertine (calcium carbonate) forms spectacular terraces. Most new rock from Yellowstone's geysers is called geyserite, a noncrystalline mineral chemically similar to glass. Exhibits at Albright Visitor Center portray the park's history and wildlife and tell how the U.S. Army protected the park from 1886 to 1916. Park headquarters is in the buildings of Ft. Yellowstone, a 19th-century cavalry post. Gardiner, Mont., lies 5 miles north. The Yellowstone River flows north to join the Missouri River.

**Old Faithful.** Old Faithful Geyser is the world's best known geyser. Its eruption intervals have long varied around an average of 65 minutes, ranging from 30 to 120 minutes. Recent earthquakes have lengthened the average interval to 75 minutes. Eruption times of nearby geysers are available at the visitor center.

## To Tower Roosevelt and Canyon Village

The road east from Mammoth Hot Springs leads you 4 miles to Undine Falls (0.2 miles to Lava Creek picnic area). Three miles further east you look for waterfalls and muskrats at Blackfoot Ponds. Next, Blackfoot Plateau Drive, a one-way dirt road eastbound, leaves the main road to traverse grass and sagebrush-covered hills and forests of Douglas fir, Engelmann spruce and lodgepole pine. Watch for bighorn antelope, mule deer and elk. Scattered graves of quaking aspen trees turn gold in autumn. The trail side road leads to a portland redwood turn. Such trees may be found over hundreds of square miles in northern Yellowstone. Some are still in an upright position.

**Tower-Roosevelt to Northeast Entrance.** Lamar Valley, accessible all year, is winter range for elk and bison. During the park's main season you may camp at Slough Creek or Pebble Creek campgrounds en route to the Northeast Entrance. 29 miles from Tower Junction, Bayview to Silver Gate (11 miles) and Cooke City (14 miles). Mont. and the Bearfoot Highway climbs to 10,340 feet at Bearfoot Pass.

**Tower-Roosevelt to Canyon.** Tower Fall tumbles 132 feet, was named by the adjacent volcanic peaks. Tower Creek flows into the Yellowstone River. South from Tower Fall, as you drive up Mount Washburn, look east down into prime grizzly bear country on Antelope Creek. This area is closed to human travel to afford the bears refuge. **DO NOT ATTEMPT TO FEED OR APPROACH BEARS.** The main road next crosses Overlook Pass at 8,850 feet elevation. Amid broad leaved whitebark pines and spruce-fir forest, the road descends to a prehistoric amphitheater. The road descends to a prehistoric amphitheater. The road descends to a prehistoric amphitheater.

**Canyon.** A 2.5-mile loop road (one way) leads first to a spur road to Inspiration Point. The Grand Canyon of the Yellowstone River plunges 1,000 feet. The canyon's colors were created by hot water acting on volcanic rock. It was not these colors but the river's yellow banks at its distant confluence with the Snake River that occasioned the Minnetaree Indian name that French trappers translated as *roche jaune*.



Tower of Babel, a large rock formation in the Tower-Roosevelt area.

**Early Visitors.** These folks took the late 1800s into the Grand Canyon of the Yellowstone, where the world's first national park was born. Uncle Tom Richardson served their needs.

**Yellowstone.** The canyon has been rapidly downcut more than once, perhaps by great glacial outburst floods. Little deepening takes place today.

**Grandview Point.** This overlooks the canyon. The park's Lookout Point affords a vista of Lower Falls and a steep trail descends to a closer viewpoint. Black on the main road (turn left in 0.3 miles) to view the brink of the 100 foot Upper Falls. On the main road again, go 0.6 miles south to Antelope Point Road and the cross Childrens Bridge to Uncle Tom's Parking Area. Trails here offer close views of the Upper and Lower Falls. South Rim Drive leads to Antelope Point for another view of the canyon and Lower Falls.

**Hayden Valley.** The road here follows the Yellowstone River's meanderings across a former lakebed. Over geological time it has drained into the Pacific Ocean. The Arctic Ocean via Hudson Bay. A swimming is discouraged even where not prohibited. Such cold waters can cause potential fatal hypothermia or hypothermia in minutes.

## The Lake Area

**East Entrance to Fishing Bridge Junction.** Cody, Wyo., lies 50 miles beyond the East Entrance. As you cross 5,530-foot elevation Sylvan Pass, watch for pikas and yellow-bellied marmots. Illustrated above is the rocky debris of talus slopes. You descend the west slope of the Absaroka Range, an eroded volcanic range named for the Crow Indians. Near Yellowstone Lake a spur road leads to Lake Butte Overlook for a view of this immense body of water. Yellowstone Lake occupies only the southeast quarter of the Yellowstone caldera (see top text). At the overlook you are 4 miles outside the caldera's east boundary. Just north of the lake the Earth's surface has recently risen as much as 1 inch per year. This suggests future volcanic activity here. As you drive along the lake's edge, you can see Steamboat Springs. This is a hot spring remnant located on a line of faults or fractures in the Earth, that also pass through Mary Bay and Indian Pond to the northwest. Bay and pond both occupy geologically recent hydrothermal explosion craters. The bottom sediments in Mary Bay are still very warm. Watch for moose browsing in the sedge meadows and marshes along Pelican Creek flats as you approach Fishing Bridge.

**Exhibits at Fishing Bridge Visitor Center** feature the park's birds. Fishing Bridge itself spans the Yellowstone River, the lake's outlet. The bridge was closed to fishing in 1973. Fishing Bridge now offers one of the best wild trout spawning spots anywhere for most of the summer. White pelicans feed on the native cutthroat trout. Because of a high level of bear activity only hard-sided units are allowed to camp in the Fishin' Bridge area.

**Yellowstone Lake** is North America's largest mountain lake. Over geological time it has drained into the Pacific Ocean. The Arctic Ocean via Hudson Bay. A swimming is discouraged even where not prohibited. Such cold waters can cause potential fatal hypothermia or hypothermia in minutes.

**Boating is permitted on some park lakes.** Permits—required for all watercraft—and advice on canoeing and kayaking can be obtained at ranger stations at Lake Village or at Grand Village. A marina is at Bridge Bay and boat ramps are at Grand Village.



Native Fish, likely a cutthroat trout, in a stream.

**Traveling toward West Thumb you may walk or bike a rough spur road starting south of Bridge Bay to see the natural bridge for which the area is named: Gull Point Drive loops off the Grand Loop Road for a closer view of the lake's edge.**

**West Thumb and Orient Village.** Walk the boardwalk through the geyser basin at lake's edge at West Thumb. Intense heat measured in lake sediments below. West Thumb indicates a shallow thermal system underlying this more recent caldera within the Yellowstone caldera. Should the lake level fall just a few feet, an immense steam hydrothermal explosion could occur here. That is what created the craters now filled by Mary Bay and Indian Pond, described above. Exhibits at Grand Village Visitor Center, 2 miles south of West Thumb, highlight the role of fire in Yellowstone. Fishing, boating and backcountry use permits are available at the ranger station.

**For more information about the park's wildlife.** Superintendent, Yellowstone National Park, Yellowstone National Park, Wyo. 82106-0188. Telephone: (307) 344-2386, or (307) 344-7381.



**Yellowstone National Park**  
**Wyoming / Idaho / Montana**

**National Park Service  
U.S. Department of the Interior**

### Mammoth Hot Springs

## Canyon Village

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### Emergency

If you call 911, the emergency services will arrive at your location within 10 minutes.

1-800-368-7073

### Winter road closures


In early March, winter weather is likely to cause road closures. The only way to get to the road is by using a snow machine. Between the North and South, it is a snow machine. It is a snow machine.

### Backcountry use


Backcountry use is a popular activity in the area. The only way to get to the backcountry is by using a snow machine. Between the North and South, it is a snow machine. It is a snow machine.

### Check the park newspaper


The seasonal dates of services and facilities




Person standing next to a sign




Person standing next to a sign




Person standing next to a sign



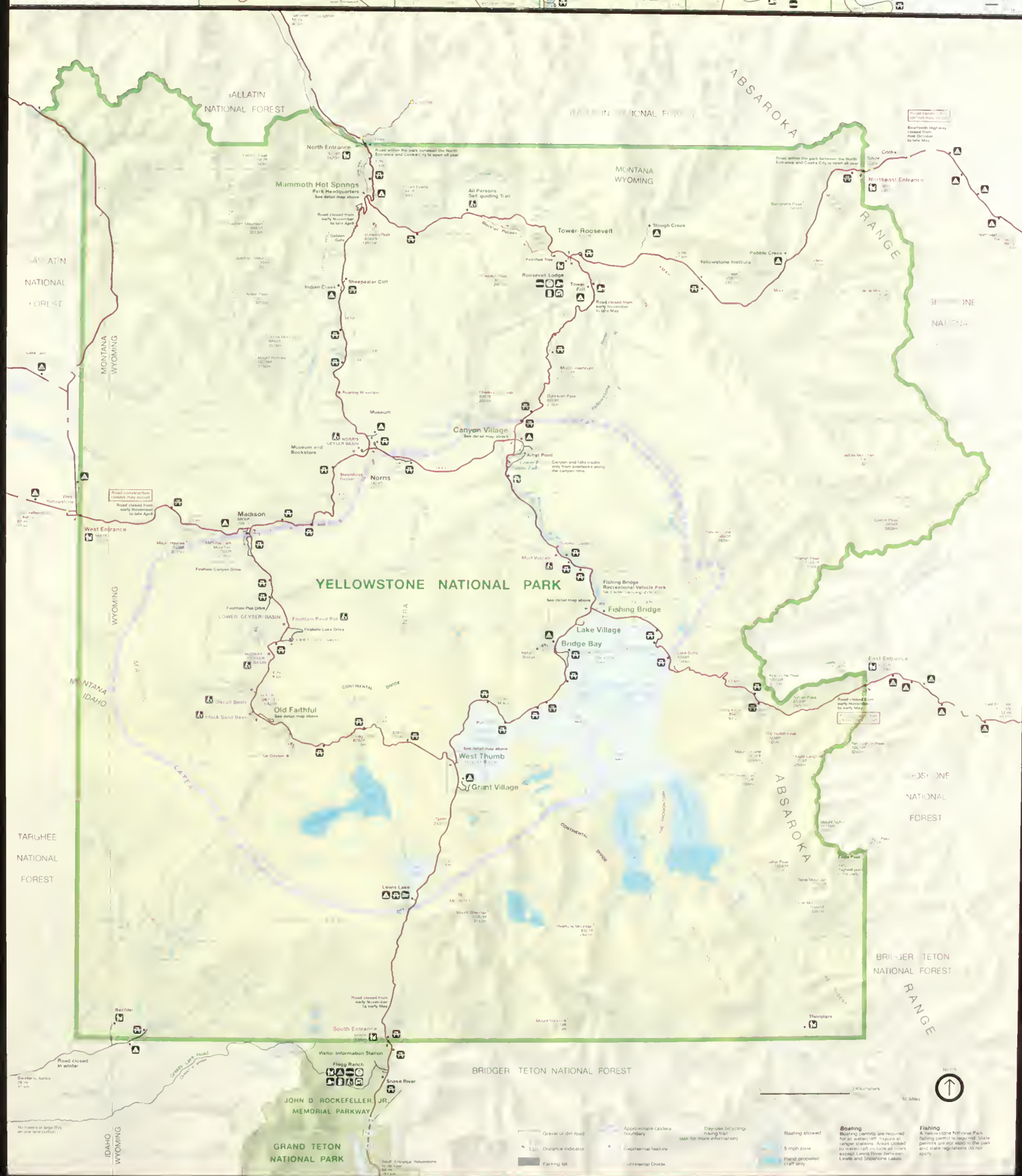
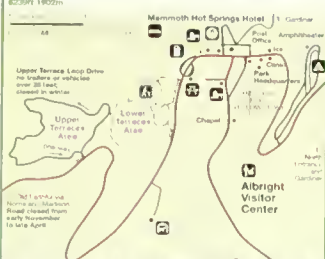
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